12 89. The isolated nucleic acid molecule of claim 75, which is RNA.

13 90. The isolated nucleic acid molecule of claim 75, wherein said polynucleotide is fused to a heterologous polynucleotide.

14 91. The isolated nucleic acid molecule of claim 90, wherein said heterologous polynucleotide encodes a heterologous polypeptide.

15 92. A recombinant vector comprising the nucleic acid molecule of claim 75.

16 93. A genetically engineered host cell that comprises the nucleic acid molecule of claim 75.

17 94. A genetically engineered host cell that comprises the nucleic acid molecule of claim 75 operatively associated with a regulatory sequence that controls gene expression.

18 95. A recombinant method for producing a polypeptide, comprising culturing the recombinant host cell of claim 94 under conditions such that said polypeptide is expressed and recovering said polypeptide.

19 96. An isolated nucleic acid molecule which maps to the same chromosome location as SEQ ID NO: 1.—

Remarks

Applicants respectfully request that the Examiner consider the amendments and remarks submitted herein in lieu of the RESPONSE TO OFFICE ACTION AND AMENDMENT, filed August 3, 1998.

The title has been amended to more clearly indicate the claimed invention. The specification has been amended to reflect the change of address for the American Type Culture Collection. Thus, no new matter has been added by way of amendment to the specification.

Claims 75-96 are pending in the application. Claims 55-74, which were filed with the RESPONSE TO OFFICE ACTION AND AMENDMENT, filed August 3, 1998, have been canceled in favor of new claims 75-96 in order to more precisely define the invention. Support for these new claims can be found throughout the specification and original claims. More specifically, support for claims 75-81 can be found, for example, at page 8, lines 5-13 and original claim 1.

Support for claims 82 and 83 can be found in the specification at page 12, lines 14-16 and page 13, lines 18-21. Support for claims 84 and 85 can be found in the specification at page 10, lines 6-7 and 19-21.

Support for claims 75-81, 86 and 87 can be found in the specification at page 20, lines 4-5, original claim 1 and SEQ ID NO:1. In particular, the specification at page 20, lines 4-5 states that the "[p]olypeptides of the present invention *may* also include an initial methionine amino acid residue." (Emphasis added). This statement indicates that the polypeptides of the present invention include polypeptides having the initial methionine and polypeptides having the initial methionine removed. As those of ordinary skill in the art would appreciate, the initial methionine can be post-translationally removed depending on the choice of host cell in which the polypeptide is expressed. Accordingly, a person of ordinary skill would have understood the present inventors to have been in possession of the claimed subject matter, i.e., "a polynucleotide encoding a polypeptide comprising amino acids 1 to 352" and "a polynucleotide encoding a polypeptide comprising amino acids 2 to 352."

Furthermore, the ATG codon that encodes the first amino acid residue (Met) of the HGDNR10 polypeptide sequence is at positions 259-261 in SEQ ID NO:1. Similarly, the TTG codon that encodes the last amino acid residue (Leu) of the polypeptide sequence is at

positions 1312-1314 in SEQ ID NO:1. Thus, the nucleotides that encode the first and last amino acid residues of the HGDNR 10 polypeptide are specifically indicated by the specification. As discussed above, the specification at page 20, lines 4-5 states that the "[p]olypeptides of the present invention *may* also include an initial methionine amino acid residue." (Emphasis added). This statement indicates that the polypeptides of the present invention include polypeptides having the initial methionine and polypeptides having the initial methionine removed. The second amino acid residue (Asp) is at positions 262-264 in SEQ ID NO:1. Thus, the nucleotides that encode the second amino acid residue of the HGDNR 10 polypeptide are also specifically indicated by the specification. Accordingly, a person of ordinary skill would have understood the present inventors to have been in possession of the claimed subject matter, i.e., "a polynucleotide comprising nucleotides 259 to 1314 in SEQ ID NO:1" and "a polynucleotide comprising nucleotides 262 to 1314 in SEQ ID NO:1."

Support for claims 90 and 91 can be found in the specification, for example, at page 8, line 28 to page 10, line 3.

Claims 92-95 are supported at page 13, line 34 to page 19, line 30. Claim 96 is supported at page 31, line 19 to page 32, line 29.

Thus, no new matter has been added by way of amendment to the claims.

Rejections under 35 U.S.C. § 112, first paragraph

In the Office Action dated April 2, 1998, claims 21, 22, 25, 28, 30-32, 34-36, 38, 39, 45-50, 52 and 53 were rejected under 35 U.S.C. § 112, first paragraph, because the specification allegedly does not reasonably provide enablement for polynucleotides encoding a "mature" polypeptide. Applicants respectfully disagree. However, solely in an effort to

expedite prosecution, the presently pending claims do not recite polynucleotides encoding a "mature" polypeptide. Thus, the rejection has been rendered moot.

Claims 21, 22, 25, 28, 30-32, 34-36, 38 and 40 were rejected under 35 U.S.C. § 112, first paragraph, because the specification is allegedly not enabling for polynucleotides that are at least 95% identical to the reference polynucleotide.

Applicants respectfully disagree. However, Applicants are aware that there is a current policy at the PTO to reject all claims reciting the "% identity" language where there is no explicit description of an algorithm and parameter settings in the specification. Consequently, solely in an effort to expedite prosecution, the presently pending claims do not recite "% identity" language. Thus, the rejection has been rendered moot.

Claims 38-41 were were rejected under 35 U.S.C. § 112, first paragraph, because the specification is allegedly not enabling for producing all polypeptides having a sequence other than SEQ ID NO:2 which have similar functional properties as the polypeptide of SEQ ID NO:2. Applicants respectfully traverse as applied to the pending claims. However, solely in an effort to expedite prosecution, the presently pending claims not recite the "% identity" language that apparently precipitated this rejection. Thus, the rejection has been rendered moot.

Rejections under 35 U.S.C. § 112, second paragraph

Claims 21-54 were rejected under 35 U.S.C. § 112, second paragraph, as allegedly being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Applicants respectfully disagree. However, Applicants are aware that there is a current policy at the PTO to reject all claims reciting the "% identity" language where there is no explicit description of an algorithm and parameter settings in the specification. Consequently, solely in an effort to expedite prosecution, the presently pending claims do not recite "% identity" language. Thus, the rejection has been rendered moot.

Rejections under 35 U.S.C. § 102

Claims 21, 22, 25, 28, 30, 31, 34, 35, 38 and 40 were rejected under 35 U.S.C. §102(b) as allegedly being anticipated by Chuntharapai *et al.* It is the Examiner's position that Chuntharapai *et al.* anticipate the claimed invention because the claims recited terms such as "mature HDGNR10 protein" or "mature HDGNR10 polypeptide" and these terms are used interchangeably with "G-protein chemokine receptor" in the instant specification. Thus, the Examiner concludes that the recitations "mature HDGNR10 protein" or "mature HDGNR10 polypeptide" encompass all G-protein chemokine receptors.

Applicants respectfully traverse as applied to the pending claims. As the Examiner will note the pending claims no longer recite "mature HDGNR10 protein." Rather the pending claims explicitly recite, *inter alia*, SEQ ID NO:1 or SEQ ID NO:2. Thus, Chuntharapai et al. do not anticipate the currently pending claims. Applicants respectfully request that the rejection be withdrawn.

Conclusion

This application is believed to be in a condition for allowance. Notice to that effect is earnestly solicited. If, for any reason, a personal communication will expedite prosecution of

this application, the Examiner is invited to telephone the undersigned directly at (202) 371-2627.

Respectfully submitted,

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Date: August 28, 1998

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